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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/974,853	10/12/2001	Keima Takabayashi	0445-0310P	7444

7590 06/22/2005

BIRCH, STEWART, KOLASCH & BIRCH, LLP  
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Falls Church, VA 22040-0747

EXAMINER
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TORRES VELAZQUEZ, NORCA LIZ

ART UNIT	PAPER NUMBER
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1771

DATE MAILED: 06/22/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/974,853	TAKABAYASHI ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Norca L. Torres-Velazquez	1771	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 12 April 2005.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1,3-5,10 and 15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,3-5,10 and 15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Response to Arguments***

1. Applicant's amendment and arguments filed April 12, 2005 have been fully considered but they are not persuasive.

a. Applicants argue that the parts of the JP'895 disclosure do not equate to the present invention and that the sheet disclosed in JP'895 does not have a low-friction part as instantly claimed.

The claimed low-friction part as claimed herein has a coefficient of static friction of 0.01 to 1.0 and the cleaning area has a coefficient of static friction of 0.1 to 4.0. It is noted that the ranges claimed overlap and it is possible to have materials with the same coefficient of static friction. The Examiner maintains her position that the meshed fabric portion of the intermediate sheet of the JP'895 reference would read on the presently claimed first sheet and the tacky adhesive portion to the second sheet of the present invention providing for a cleaning area and that the base sheet of the JP'895 reference would equate to the low-friction area. It is the Examiner's position that the coefficient of friction values claimed herein would be inherent to the materials used by the reference. It would be expected to have a lower coefficient of friction in the base sheet of the reference in comparison to the intermediate sheet that includes a tacky adhesive.

b. Applicant's argue that the JP'415 reference is not analogous to the JP '895 and/or JP '761.

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The Examiner maintains her position that these reference are directed to nonwoven structures under the same classification [Int. Cl. A47L 13-16], and are all directed to nonwoven materials, therefore are analogous.

c. With regards to new claim 15, it is noted that the mesh structure in the JP'895 is disposed on top of the tacky adhesive equated to the dust-holding part. Therefore, claim 15 is also met by the prior art of record.

Therefore, claims 1, 4-5, 10 and new claim 15 are rejected herein.

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1, 3, 4, 5, 10 and 15 are rejected under 35 U.S.C. 103(a) as being unpatentable over JP 09-224895 in view of JP 10-060761 and JP 2000-328415.

The JP 09-224895 discloses a sheet for cleaning that is composed of a base material sheet made of a nonwoven fabric and an intermediate sheet, which is a tacky adhesive and a front surface of a meshed fabric. The reference teaches that the dirt is entangled with the nonwoven fabric fibers of the front surface sheet and captured by the tacky adhesiveness or the through holes of the meshed fabric. (Abstract) The meshed fabric portion of the intermediate sheet of the JP'895 reference would read on the presently claimed first sheet and the tacky adhesive portion to the second sheet of the present invention providing for a cleaning area and that the base sheet of the JP'895 reference would equate to the low-friction area. It would be expected to

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have a lower coefficient of friction in the base sheet of the reference in comparison to the intermediate sheet that includes a tacky adhesive. With regards to new claim 15, it is noted that the mesh structure in the JP'895 is disposed on top of the tacky adhesive equated to the dust-holding part.

However, the JP 09-224895 reference does not teach that the nonwoven fabric is air-laid and that the fibers of the air-laid surface have a fineness of 23 to 200 dtex.

The JP 10-060761 reference discloses a cleaning sheet produced by arranging two kinds of thermally fusible short fibers having a fiber length of 5 mm and different fiber diameters into three-dimensional structures, respectively, by an air-laying method. (Abstract)

The JP 09-224895 and JP 10-060761 references fail to teach the fineness of the fibers being of 23 to 200 dtex [20 d – 180d].

JP 2000-328415 discloses a nonwoven fabric produced by dispersing staple fibers composed of a hot-melting conjugate fiber of a length of 3-4 mm and a fineness of 30-80 deniers. (Abstract)

The Japanese references cited above are from the same field of endeavor, directed to nonwoven structures classified under Int. Cl. A47L 13-16.

It would have been obvious at the time the invention was made to a person having ordinary skill in the art to modify the nonwoven material of the cleaning sheet and provide it with an air-laid surface with the motivation of preventing gathered dust from dropping as disclosed in the JP 10-060761 Abstract. Further, it would have been obvious at the time the invention was made to a person having ordinary skill in the art to provide it with fibers of fineness of 30-80 deniers with the motivation of providing a material suitable to make an

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absorptive article as disclosed by the JP 200-328415 Abstract/Title. It is the Examiner's position that the coefficient of friction values claimed herein would be inherent to the materials used by the references.

4. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

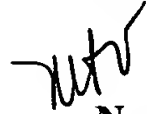
A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Norca L. Torres-Velazquez whose telephone number is 571-272-1484. The examiner can normally be reached on Monday-Thursday 8:00-5:00 pm and alternate Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on 571-272-1478. The fax phone number for the organization where this application or proceeding is assigned is 703-872 9306.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



**Norca L. Torres-Velazquez**  
**Primary Examiner**  
**Art Unit 1771**

June 17, 2005